

Determining Handedness from Earwax Accumulation and Dermal Characteristics

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Introduction

Recent studies have linked handedness not to any neurological quality, but rather, to properties of the spinal cord linked to average fetal position during gestation. The study concluded that if a fetus predominantly favored its left side during fetal development, that this results in right-handedness and vice versa, with ambidexterity being explained by fetuses spending equal amounts of time lying on their left or right sides.

Abstract

If this is the case, such a phenomenon could be explained by the undesired accumulation of growth hormones asymmetrically on one side of the body. Anatomical elements such as nerve fibers could be expected to take on different physical characteristics (such as increased thickness or density) due to this accumulation of hormones, leading ultimately to poorer nerve conduction on one side (poorer conduction on the side with the excessive exposure to the growth hormone.)

We can also deduce from this hypothesis that if nerve fibers are affected dramatically enough by this hormone pooling in order to create a tendency toward single-hand dominance that perhaps other anatomical features could be influenced by the same factors. If this is the case, we might be able to guess at the handedness of a person by looking at another trait likely to be affected by fetal postural hormone pooling.

Examples of such features could be expected to include a greater tendency toward excessive earwax production in the ear opposite to the side of dominant-handedness. For example, if a person is right-hand dominant, they might have increased earwax buildup in their left ear versus the right. Without knowing whether someone was left or right hand-dominant, the presence of an asymmetrical quantity of earwax in the left ear could be used to deduce that the individual is right-handed without having any other available information.

Other proxy methods which may be used to achieve the same ends could be predicted to include observing the quantity and level of activity of sebaceous glands in the dermis on the left versus the right sides of the body and the height of one ear versus the other; an elevation of one ear being caused, most likely, by increased collagen density on one side of the body caused by the hormonal pooling effect. Phenomenon such as doubled moles and doubled hairs (two follicles extremely close to one another) could be expected to be found almost exclusively on the side of the body opposite of the side of hand-dominance.

Conclusion

Although likely not of practical relevance, physiological features which correlate with handedness can confirm for us the verisimilitude of the hypothesis that hormonal and mRNA pooling, particularly in fetal development, may play a more-significant-than-expected role in physical development and disease risk.